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Orally administered therapeutic protein compsn. - comprises combination
 of protein and stabilising agent in aq. soln. to form microcapsules.

Patent Assignee: UNIV CINCINNATI (UYCI-N)

Inventor: LITWIN A; MICHAEL J G; MICHAEL J; GABRIEL M J; GABRIEL M

Number of Countries: 023 Number of Patents: 013

Patent Family:

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Priority Applications (No Type Date): US 92994932 A 19921222; US 91719160 A
 19910621; US 95405604 A 19950120

Cited Patents: BE 621398; EP 130163; GB 2178313; JP 56142211; 2.Jnl.Ref

Patent Details:

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Designated States (Regional): AT BE CH DE DK ES FR GB GR IE IT LI LU MC
 NL PT SE

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Abstract (Basic): EP 603992 A

An orally administered therapeutic protein (A) compsn. comprises a protein microencapsulated, in the absence of organic solvents, with a water based enteric coating.

Also claimed are: (1) a method for administering (A); and (2) a method for forming the therapeutic compsn. by forming an aq. solution contg. (A) and microencapsulating the protein with an aq. solution of an enteric coating with no organic solvents.

The enteric coating is a water based emulsion ethylacrylate methacrylic acid copolymer. (A) is selected from allergenic proteins digested fragments of allergenic proteins, viral vaccines, bacterial vaccines, protozoal vaccines, toxoids, glycoproteins, insulin, hGF, myelin basic protein, collagen S antigen, or TGF-beta. The compsn. further comprises a stabilising sugar e.g. lactose and water suspended aluminium salt.

USE/ADVANTAGE - (A) is administered orally and the coating protects it as it passes through the stomach. Upon reacting the small intestines, the basic pH of the intestinal juices dissolves the coating allowing the protein to be released. The stabilisation agent protects the protein from denaturation during encapsulation. (A), when released, induces an antigen specific response which has the specificity of the native molecule, hence it can be used as an allergen for treating human allergies.

Dwg.0/11

Abstract (Equivalent): EP 603992 B

An orally administrable therapeutic composition comprising a therapeutic protein microencapsulated in the complete absence of organic solvents with a water based enteric coating.

(Dwg.0/11)

Abstract (Equivalent): US 5591433 A

An orally administrable therapeutic composition comprises an immunogen microencapsulated in the complete absence of organic solvents with a water based enteric coating where the immunogen has an immunotherapeutic effect against an allergen in a warm blood animal.

Dwg.0/11

Derwent Class: B04

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